



Blackfoot's Non-affirmative Endings: Polarity Sensitive Topics
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<p>Problem:</p> <ul style="list-style-type: none"> Blackfoot's non-affirmatives distribute syntactically like NPIs, however unlike NPIs, they are always referential and outside the scope of negation. <p>Proposal:</p> <ul style="list-style-type: none"> Blackfoot's non-affirmatives are NPIs that correspond to the topic of a categorical judgment, whose referential existence is always <i>presupposed</i>. <p>Predictions:</p> <ul style="list-style-type: none"> If they correspond to topics, they should act like topics.

1.0 Introduction: Blackfoot's third-person non-affirmative endings

- waiksa* (wa-iks-yaa) 3rd person, animate, plural
- waistsa* (wa-ists-yaa) 3rd person, inanimate, plural
- waatsiks* (wa-ats-iks) 3rd person, animate/inanimate, singular (to be revised)

- optionally attach to right edge of verbal complex.
- inflect for number and animacy, corresponding to a third person
- only grammatical in negative and interrogative contexts.**

(1) (Elicited 2005-11)

Licensed by local Negation	
a) Nimaatsinowa(<u>waatsiks</u>) Ni-maat-ino-a- <u>waatsiks</u> 1-NEG-see.vta-DIR(LOC,3)- <u>3nonaff.sg</u> "I didn't see her"	b) Nimaatsinowa(<u>waiksa</u>) Ni-maat-ino-a- <u>waiksa</u> 1-NEG-see.vta-DIR(LOC,3)- <u>3nonaff.pl</u> "I didn't see them"
Licensed in Yes/No Questions	
c) Kikatai'nook(<u>aatsiks</u>) k-ikata'-ino-ok- <u>waatsiks</u> 2-INTG-see.vta-INV(3,LOC)- <u>3nonaff.sg</u> "Did he see you?"	d) Okatai'nook(<u>aiksa</u>) o-kata'-ino-ok- <u>waiksa</u> 3-INTG-see.vta-INV(3,LOC)- <u>3nonaff.pl</u> "Did they see him?"
Not licensed in positive contexts	
e) nitsinowa(* <u>waatsiks</u>) nit-ino-a- <u>waatsiks</u> 1-see.vta-DIR(LOC,3)- <u>3nonaff.sg</u> Target: "I saw him"	f) nitsinowa(* <u>waiksa</u>) Nit-ino-a-waiksa 1-see.vta-DIR(LOC,3)- <u>3nonaff.pl</u> Target: "I saw them."
Not licensed by super-ordinate negation	

i)
 Nimaatohkstapa ninaaksinowahsi(*waatsiks)
 Ni-maat-oht-sstaa-hpa nin-áahk-ino-a-his-waatsiks
 1-NEG-SOURCE-want.vai-loc:nonaff 1-non.fact-see.vta-DIR-cj-3:nonaff.sg
 “I don’t want to see him.”

Because of their distribution, I have analyzed them as **Negative Polarity Items (NPIs)**

Progovac 1994: Applies Binding Theory to NPI-licensing:

- Different NPIs subject to different Binding Principles:

Principle A:

Must be bound (by NEG in Infl or truth-conditional OP in Comp) in their governing category/binding domain

Principle B:

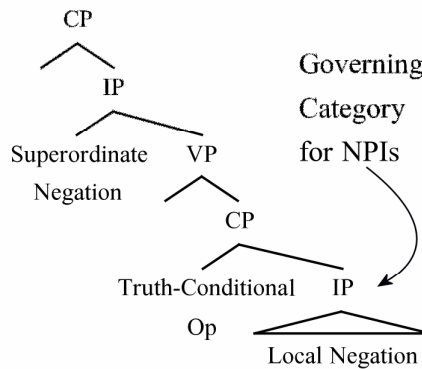
Must not be bound in their governing category/binding domain.

(where 'governing category' is delimited by the first potential antecedent – i.e. NEG in IP)

→ This predicts that licensing by non-negative contexts (Op in Comp) will pattern with super-ordinate negation, as is borne out by Progovac's data

(NPIs subject to A will be licensed by local negation, NPIs subject to B by super-ordinate negation or truth-conditional OP in Comp)

(2) Progovac's Model: IP the Governing Category for NPIs



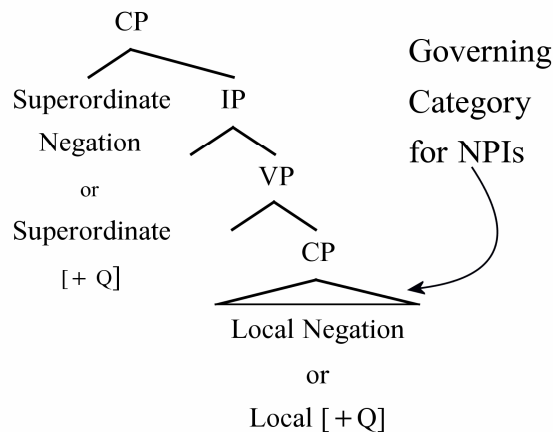
→ But the non-affirmatives don't pattern like this: non-negative licensing patterns with local negation!

(3) A table of how NPIs license cross-linguistically (see Progovac 1994 for details)

Licensed by	BF Non-AFFs	S/C I-NPIs	S/C NI-NPIs	English NPI 'until'	Chinese 'conglai'
Local Negation	Y	N	Y	Y	Y
Non-negative OP	Y	Y	N	N	N
Super-ordinate Negation	N	Y	N	N	N

This can be explained if (as proposed in Déchaine & Wiltschko 2001) NEG for BF is in Comp as opposed to Infl.

(4)



But *where* in Comp is NEG *maat*-?

- *maat*- can occur with Wh-words (*tsima* 'where', *takaa* 'who', etc) ...except for *tska* 'why/how come'

(5)

(a. Elicited 2006-07-26, b. Elicited 2007-02-20)

a.

Takáá maatsooyiwaatsiks mamii
Takaa maat-ooyi-wa-atsiks mamii
Who neg-eat.vai-3:noaff.sg fish
 "Who didn't eat fish?"

b.

tsimá máátsitsooyiwaatsiks
tsimá maat-it-ooyi-waatsiks
where neg-rel-eat.vai-3:noaff.sg
 "Where did he not eat?/Where was it that he didn't eat?"

c.

***tská maat**sooyi
Tská maat-ooyi
Why neg-eat.vai
 Target: Why didn't he eat?"

c'.

tská iihtsaoyi
tská iiht-**sa**-ooyi
why means-**neg**-eat.vai
 "Why didn't he eat?"

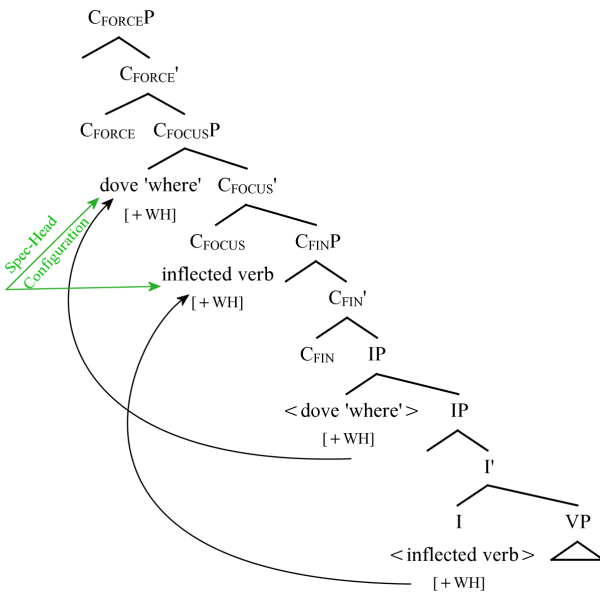
- 'Why' acting differently from other wh-words has been noted in other languages as well – in Italian, wh-elements except for *perché* 'why' and *come mai* 'how come' require I-C inversion.

(6) Rizzi's split CP for Italian (All of these phrases form the CP) (Rizzi 1999)

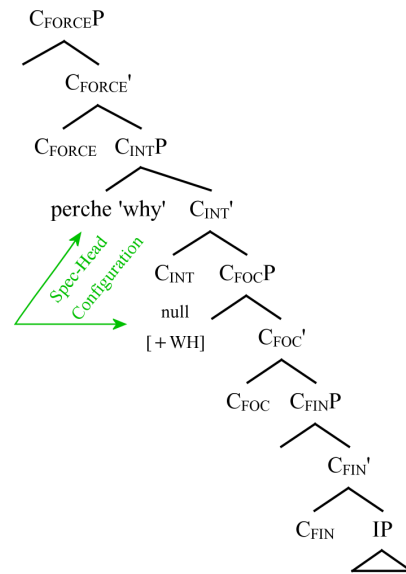
FORCE (TOP_{IC}*) INT_{ERROGATIVE} (TOP*) FOC_{US} (TOP*) FIN_{ITE}

- Wh-words generated in IP, but move to SpecFoc(us)P (diagram 7)
- *perché* and *come mai* base-generated in specINT_(errogative) P, along with a null [+wh] element in INT P's head (diagram 8)
 - (note: *why/how come* can co-occur with focus, but other wh-words cannot)

(7)



(8)

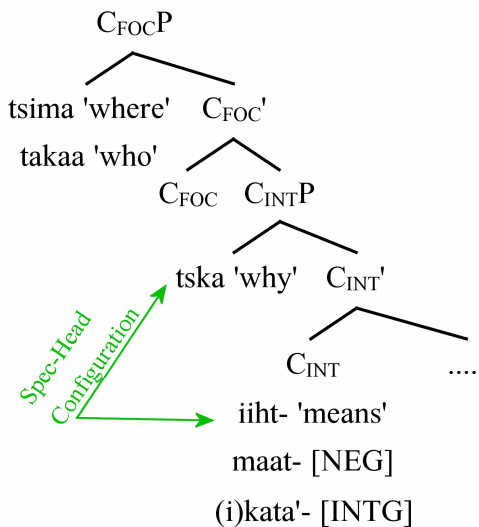


Rizzi's Wh-Criterion: A Wh-operator must be in spec-head configuration with a [+wh] head (and vice versa).

So the wh-words in specFocP require a [+wh] element in a spec-head configuration. The inflectional node carrying the [+wh] moves there, causing I-C inversion. *Perché*, already base generated with a [+wh] element in spec-head configuration, doesn't trigger this inversion. (Rizzi 1999)

(9) Split CP modified for Blackfoot

FORCE FOC (TOP*) INT (TOP*) FIN IP



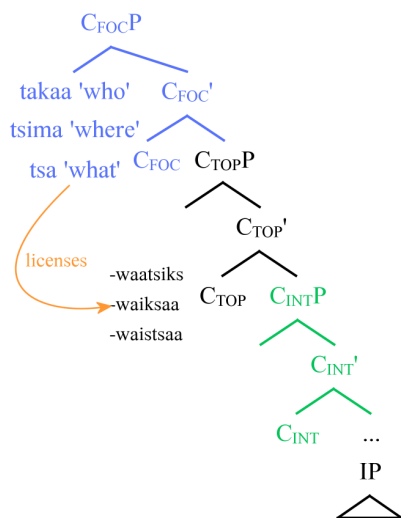
Proposal: *maat-* sits in the head of a C_{INT} Phrase.

(note negation *maat-* is in complementary distribution with the Y/N operator (*i*)*kata'*-)

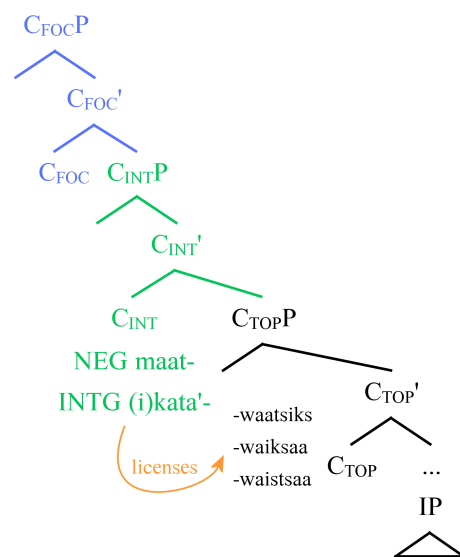
This would also be the position of Rizzi's proposed null [+wh] element which has to occur with 'why' – in BF, however, this is overtly realized as the morpheme *iiht-* which is glossed as 'means' but often seems to correspond to 'reason'. Because *tská* 'why/how come' requires this [+wh] element, negation cannot co-occur with it.

- The Non-affirmatives located in an optional Topic Phrase within the split CP
 - (below FocP when licensed by wh-word, below IntP when licensed by *maat-*, (*i*)*kata'*-, and *tská*)

(10)



(11)



This can account for the fact that the non-affirmatives are optional, and avoids the problem of NEG *maat-* delimiting a governing category (since the non-affirmatives are also licensed by wh-words).

How convenient...

But is there a semantic motivation for placing the non-affirmatives in a TopicP?

2.0 Scope Properties of the Non-affirmatives

2.1 A Problem – The non-affirmatives take wide-scope with respect to negation

Cross-linguistically, NPIs take narrow-scope with respect to negation ($\neg\exists$), generally seen as a consequence of their licensing requirements (bound by NEG).

(12)

- a. She hasn't the slightest idea. (= there's this slightest idea, but she hasn't got it)

b. She doesn't see anyone. (=/= there's this person that she didn't see)

(13) NPIs cross-linguistically take narrow scope (¬∃)

Turkish NPIs take narrow scope (¬∃) (Progovac 1994:35)

a.

Hiç kimse Ali-hi gör-me-di
Any person Ali-ACC see-not-PAST
 "No one saw Ali."

Catalan NPIs take narrow scope (¬∃) (Progovac 1994:35)

b.

Ningú no ha vingut
Nobody not has come
 "Nobody has come."

Japanese NPIs take narrow scope (¬∃) (Progovac 1994:36)

c.

Daremo ko-nakatta
Anyone came-neg-(Past)
 "No one came."

The Blackfoot non-affirmative endings, on the other hand, *always* correspond to a specific referential entity, being disallowed when interpreted within the scope of negation.

(14) (Elicited 2005-11)

a)

Nitsinowa ani otomitaam ki ostoyi nimaatsinowawa**waatsiks**
 Nit-ino-a ann-yi ot-omitaam ki osto-yi nit-maat-ino-a-**waatsiks**
 1-see.vta-DIR that-3's 3S-dog and him-3's 1-NEG-see.vta-DIR-**3nonaff.sg**
 "I seen his dog, but **him**, I didn't see"

b)

*Nimaatsapi**waiksaa** ninaiks
 ni-maat-iyaaapi-**waiksaa** ninaa-iksi
 1-NEG-see.vai-**3nonaff.pl** man-PL
 Target: I didn't see any men

c)

Nimaatsapihpa ninaiks
 Ni-maat-iyaaapi-hpa ninaa-iksi
 1-NEG-see.vai-loc:nonaff man-PL
 "I didn't see any men"

d)

*nimaatsapi**waatsiks** ninaa
 ni-maat-iyaaapi-**waatsiks** ninaa
 1-NEG-see.vai-**3nonaff.sg** man
 Target: I didn't see a man

e)

nimaatsapihpa ninaa
 ni-maat-iyaaapi-hpa ninaa
 1-NEG-see.vai-loc:nonaff man
 "I didn't see a man"

(15) BF Non-affirmatives' Atypical Scope Properties as compared to other languages

	Blackfoot NPIs	English NPIs	Turkish NPIs	Japanese NPIs	Catalan NPIs
Referential ? (∃¬)	Y	N	N	N	N

2.2 Proposal: They correspond to a Topic, which must always be presupposed

Topics are always presupposed, and presupposed elements are always referential, no matter what kind of sentential operators are present.

But what do I mean by "topic"?

I mean a topic, as in the Topic that delineates the difference between a *thetic judgment* and a *categorical judgment*.

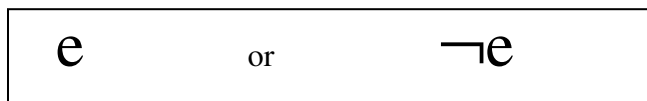
2.3 Theoretical Framework: The Thetic-Categorical Distinction:

Brentano (1874, 1924), Kuroda (1972, 1992), Ladusaw (1994)

When you make an utterance, you are also making a mental evaluation, or *judgment*, of a situation or state. There are two kinds of judgments: thetic judgments and categorical judgments.

- **Thetic judgments** consist only of the assertion or denial of an entity or event.

→ an existential statement (Lambrecht 2001: neutral description)



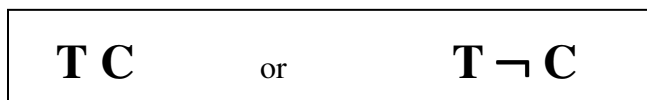
- **Categorical judgments** have the traditional Aristotelian *subject-predicate*, or *topic-comment* dichotomy.

(Some people call this a Topic-Focus distinction instead, where in a thetic judgment, both the semantic subject and predicate are in focus, but in a categorical judgment, the semantic subject and predicate are in some way divided into a Topic and a Focus)

(Terms like *topic-comment* are used instead of *subject-predicate* in order to avoid confusion with the syntactic *subject* associated with specIP.)

A topic is identified, and then a property is either affirmed or denied for that topic.

→ predication



Application to Blackfoot:

(16) *Native Blackfoot speaker intuition:*

“here it’s like you’re making a statement (with waatsiks), but here (without waatsiks) you’re just saying something casually.” (BB, pc)

Categorical judgment	=	making a statement (<i>about</i> something)
Thetic judgment	=	saying something casually (a description)

"For instance, you would be “making a statement” when uttering “the sun rises” if you were telling a child that *this is what happens with the sun*" (Shujun Koon pc).

Or to put it another way: you have identified the sun as the topic, and then are attributing “rising” as a property that belongs to it.

2.4 How does this account for anything?

Solution → Topics presupposed, therefore obligatory wide-scope reading

Observation: The topic of a categorical judgment is presupposed – it is always referential and cannot be nonspecific or indefinite. (Ladusaw 1994, Giannakidou 1998)

(17) Japanese

(Ladusaw 1994)

a. *thetic judgment*

b. *categorical judgment*

neko-ga asoko-de nemutte iru
 cat-nom there-loc sleeping is
 “**The/a** cat is sleeping there”

neko-**wa** asoko-de nemutte iru
 cat-**topic** there-loc sleeping is
 “**the/*a** cat is sleeping there”

(18) English: non-referential elements cannot be topics (The "as for *topic*..." test)

a.

*As for no one, I didn't see them.

b.

*As for a man, he didn't leave.

Consequence: If the non-affirmatives correspond to a topic of a categorical judgment, their existence should be presupposed – they should have a referential target.

→ The wide-scope property of the non-affirmatives arises from their topical nature

3 Predictions (If these correspond to topics...then they should act like topics...)

Property	Topics	Blackfoot Non-Affirmatives
Not restricted by thematic roles	✓	?
Felicitous with Generic Sentences	✓	?
Not restricted to referring to entities	✓	?

3.1 Topics are not restricted to a specific thematic role

- There are no restrictions with respect to thematic relations when identifying possible topic of a categorical judgment (Lambrecht 2001, Ladusaw 1994)

(19)

(Ladusaw 1994)

a.

neko-**wa** inu-ga oikakete iru
 Cat-**topic** dog-nom chasing is

“The cat is being chased by the dog.” (note, not passive, like 20b)

(20)

(Yuri Ohono pc.)

a.

inu-**wa** neko-o oikakete iru
 dog-**topic** cat-acc chasing is
 "The dog is chasing the cat."

b.

neko-**wa** inu-ni oikakerarete iru
 cat-**topic** dog-? chase.passive is
 "The cat is being chased by the dog."

Prediction: The non-affirmatives, as topics, likewise should not be restricted to corresponding to specific thematic arguments. → This is the case:

(21)

(Elicited 2005-11)

a) Agreement → **agent**, PL

Nimaatoh'ok**waiksaa** oma mamii
 Ni-maat-ohkot-ok-**waiksaa** om-wa mamii
 1-NEG-give.vta-INV-**3nonaff.pl** that-3 fish
 "They didn't give me the fish(sg) "

b) Agreement → **goal**, PL

Nimaatohkuta**waiksaa** omi apani
 Ni-maat-ohkot-a-**waiksaa** om-yi apánii
 1-NEG-give.vta-DIR-**3nonaff.pl** that-3's bfly
 "I didn't give the butterfly to them."

c) Agreement → **theme**, PL

Kimaatohkutawa**waiksaa** anniksists aatsistaiksi
 Ki-maat-ohkot-a-**waiksaa** ann-iksi-sts aatsista-iksi
 2-NEG-give.vta-DIR-**3nonaff.pl** that-PL-?? rabbit-PL
 "You didn't give the rabbits to him!"

d) Agreement → **agent**, SG

Maatsinoyii**waatsiks** omiksi ainihkiksi
 Maat-ino-yii-**waatsiks** om-iksi á-inihki-iksi
 NEG-see.vta-3DIR-**3:nonaff.sg** that-PL DUR-sing.vai-PL
 "He didn't see those singers"

3.2 Topics are associated with generic sentences

- Generic sentences are generally seen as categorical judgments *par excellence* (Heycock & Doron 2003)

(22)

(Heycock & Doron 2003:19)

a.

kitune-**wa** akai
 fox-**TOP** red
 "Foxes are red."

So if generic sentences are categorical judgments, and categorical judgments have a Topic-Comment structure, there must be a Topic present in a generic sentence...

Prediction: Non-affirmatives should be able to be construed with nouns that have a generic reading. → This is the case (note: non-affirmatives usually cannot be construed with bare noun phrases, see 14 b-e above)

(23) (Elicited 11-2005)
 Ninaiksi maataikskimawaiksaa mamiiksi aikakohmihkayaa mamiiksi
 Ninaa-iksi maat-á-iksimaa-waiksaa mami-iksi á-ikak-omiikhaa-yaa mami-iksi
 Man-PL NEG-DUR-hunt.vai-**nonaff.pl** fish-PL DUR-just-catch.vai-3PL fish-PL
 “Men don’t hunt fish, they catch fish.”

3.3 Topics are not restricted to referring to entities – they may refer to events

(24) Cantonese topics do not have to refer to entities (Matthews & Yip 1994:67)

a. Gwo hóì àh, deihtit jeui faai
cross sea PRT underground most fast
 “As far as crossing the harbour is concerned, the underground is the fastest.”

Prediction: This implies that the non-affirmatives should not be restricted to referring to entities – It might also refer to situations and states of affairs. → This is the case

(25) (a. elicited 2006-11-15, b.c. 2006-12-05)

- a.
 ana Tyler ki ana Edward maatáyaakomo’tsaakiwaiksaa
 an-wa Tyler ki an-wa Edward maat-wayaa-omo’tsaaki-waiksaa
 that-prox Tyler and that-prox Edward neg-both-win.vai-**3:nonaff.pl**
 “Tyler and Edward both did not win”
- b.
 nimáátsikakssksinipa(atsiks/*ikxaa) ayakomo’tsaayaa
 ni-maat-ikak-ssksini-‘p-wa-(atsiks/*ikxaa) wayak-omo’tsaa-yaa
 1-neg-even-know.vti-loc>0-**nonaff-(3sg/*3pl)** both-lose.vai-3pl
 “I didn’t know that they both lost!”
- c.
 nimáátsikakaanihpa(atsiks/*ikxaa) imo’tsaayaa
 ni-maat-ikak-waani-hp-wa-(atsiks/*ikxaa) ii-omo’tsaa-yaa
 1-neg-even-say.vai-loc-**nonaff-(3sg/*3pl)** past-win.vai-3pl
 “I didn’t say that they lost!”

In data b) and c) above, the non-affirmatives refer to the singular event 'that they (both) lost' as opposed to the plural third person subjects of the embedded clause.

(26) Summary of Topical Properties of BF Non-affirmatives

Property	Topics	Blackfoot Non-Affirmatives
Obligatory Wide-Scope	✓	✓
Not restricted by thematic roles	✓	✓
Felicitous with Generic Sentences	✓	✓
Not restricted to referring to entities	✓	✓

4.0 A Parallel with N-words in strict NC languages (Emphatic NPIs)

Giannakidou (1998) proposes a similar account for n-words that require strict negative concord (NC) contexts (Greek, Catalan, Italian). She shows that these n-words have universal semantics, and must be licensed by negation. However, these always have a semantic reading where the universal quantifier takes wide-scope with respect to negation. ($\forall \neg$)

(27) Emphatic n-words in Greek escape the semantic scope of negation (Giannakidou 1998:212)

a.

Dhen irthe **KANENAS**

Not came.3sg **everybody**

"**Nobody** came"

$\forall x$ [person(x) \rightarrow \neg **came** (x)]

b.

Dhen ipse o Pavlos **TIPOTA**

Not said.3sg the Paul **everything**

"Paul said **nothing**."

$\forall x$ [thing (x) \rightarrow \neg **said** (Paul, x)]

Thus while they need negation to be licensed, they must escape the scope of negation to be properly interpreted.

The Blackfoot non-affirmatives are then parallel to n-words in that they require negation (or some other non-veridical operator) in order to be licensed, and they always take wide-scope with respect to negation.

However, whereas with n-words, it is their *universal* property that escapes the scope of negation, with Blackfoot's non-affirmatives, it is their *existential* property.

Appendix (i.e. I bet I won't have time to get to this...)

→ An interesting property of the non-affirmatives: they are infelicitous when referring to a third person that is within the deictic-sphere.

(28)

(elicited 2005-11)

a.

#kikatainok**aatsiks** an-wa Martina

Ki-kata'-ino-ok-**waatsiks** ann-wa Martina

2-interrog-see.vta-**3:nonaff.sg** that-3 Martina

"Did Martina see you?"

b.

Kikatainok**aatsiks** ann**hk** Martina

Ki-kata'-ino-ok-**waatsiks** ann-wa-**hka** Martina

2-INTERROG-see.vta-INV-**3:nonaff.sg** that-3-**invisible** Martina

"Did Martina see you?" (where Martina is not present in the deictic sphere)

(29)

(elicited 2006-11-08)

a.

#nimaataakohtsuihpaistsaa nootsists

Ni-maat-aak-oht-ooyi-hp-waistsaa no'tsis-istsi

1-neg-fut-link-eat.vai-loc-3:nonaff.0pl my.hand-0pl

Target: I'm not going eat with my hands. (my hands, hopefully, must be in the deictic sphere)

b.

Context: I am too sick to feed myself, and my brother offers to feed me, but I am too proud to accept.

nimaatayaakohtsuihpaistsaa ana nísis óótsists

ni-maat-ayaak-oht-ooyi-hp-waistsaa an-wa nissis o'otsis-ists

1-neg-c.fut-link-eat.vai-loc-3:nonaff.0pl that.prox my.brother 3-hand-0pl

"I am not going to eat with my brother's hands!" (my brother's hands, don't need to be in the deictic sphere)

(30) Strict NC n-words as compared to Blackfoot Non-affirmative Endings

	NPIs?	emphatic?	Property within \neg scope	Property outside \neg scope
Strict NC n-words	Y	Y	\exists	\forall
BF non-affs	Y	Y	deictic-sphere?	\exists

Something to ponder...

Quantificational elements like the universal quantifier usually analyzed able to modify the nominal domain...

However in BF, quantificational elements are always found within the *verbal* domain.

What *is* encoded on BF's nominal domain are deictic notions like whether or not the noun in question is close to the speaker, close to the addressee, or outside of the deictic sphere...

→ Is there possibly a relationship between the semantics of emphatic NPIs and the semantic properties encoded on the nominal domain?

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All trees drawn using Treeform!

Derrick, Donald, (2006) Treeform, Syntax Tree Drawing Software.

<<http://www.ece.ubc.ca/~donaldd/treeform.htm>>